ABSTRACT OF THE DISCLOSURE

A method of fabricating a three-dimensional microstructure provides data corresponding to information relating to the structure of a three-dimensional microstructure design. A sample is processed in accordance with the provided data by irradiating the sample with a charged-particle beam while controlling processing conditions of the charged-particle beam. Dimensions of the processed sample are compared with the provided data to identify differences between the structure of the processed sample and the structure of the three-dimensional microstructure design. The sample is then irradiated again with a charged-particle beam to correct the identified structural differences while adjusting the processing conditions of the charged-particle beam to thereby fabricate a three-dimensional microstructure having a structure substantially the same as the structure of the three-dimensional microstructure design.